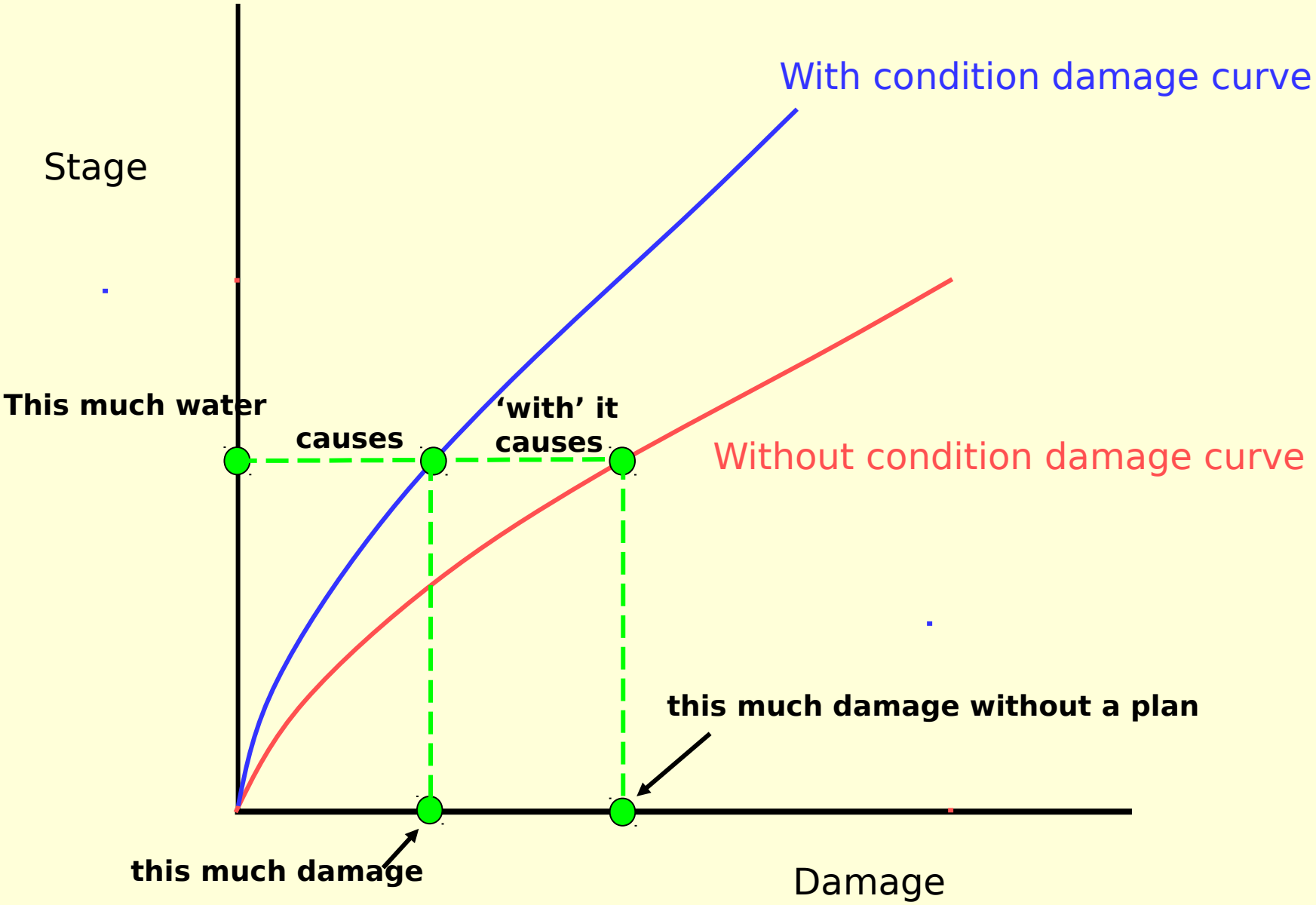
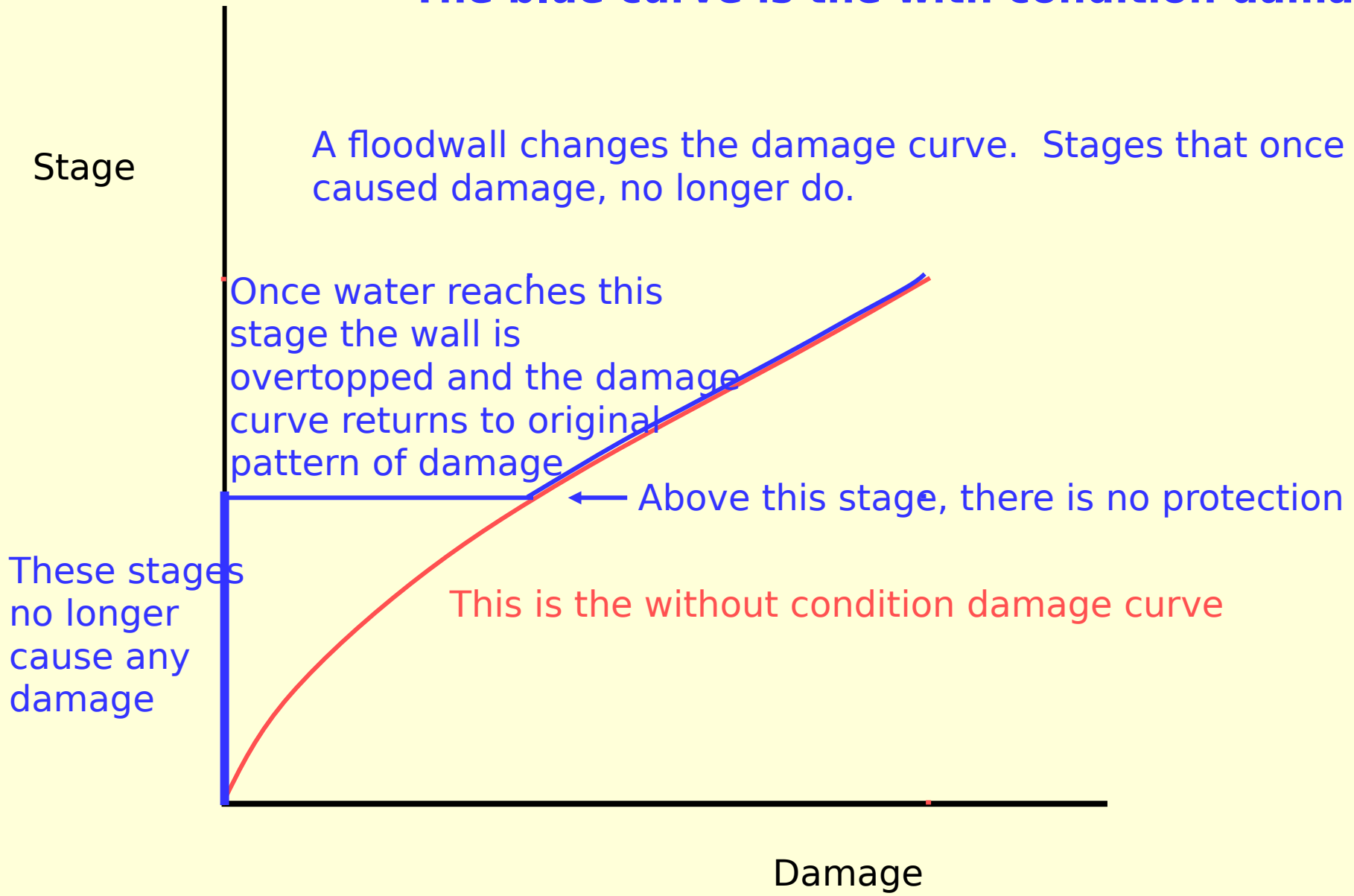
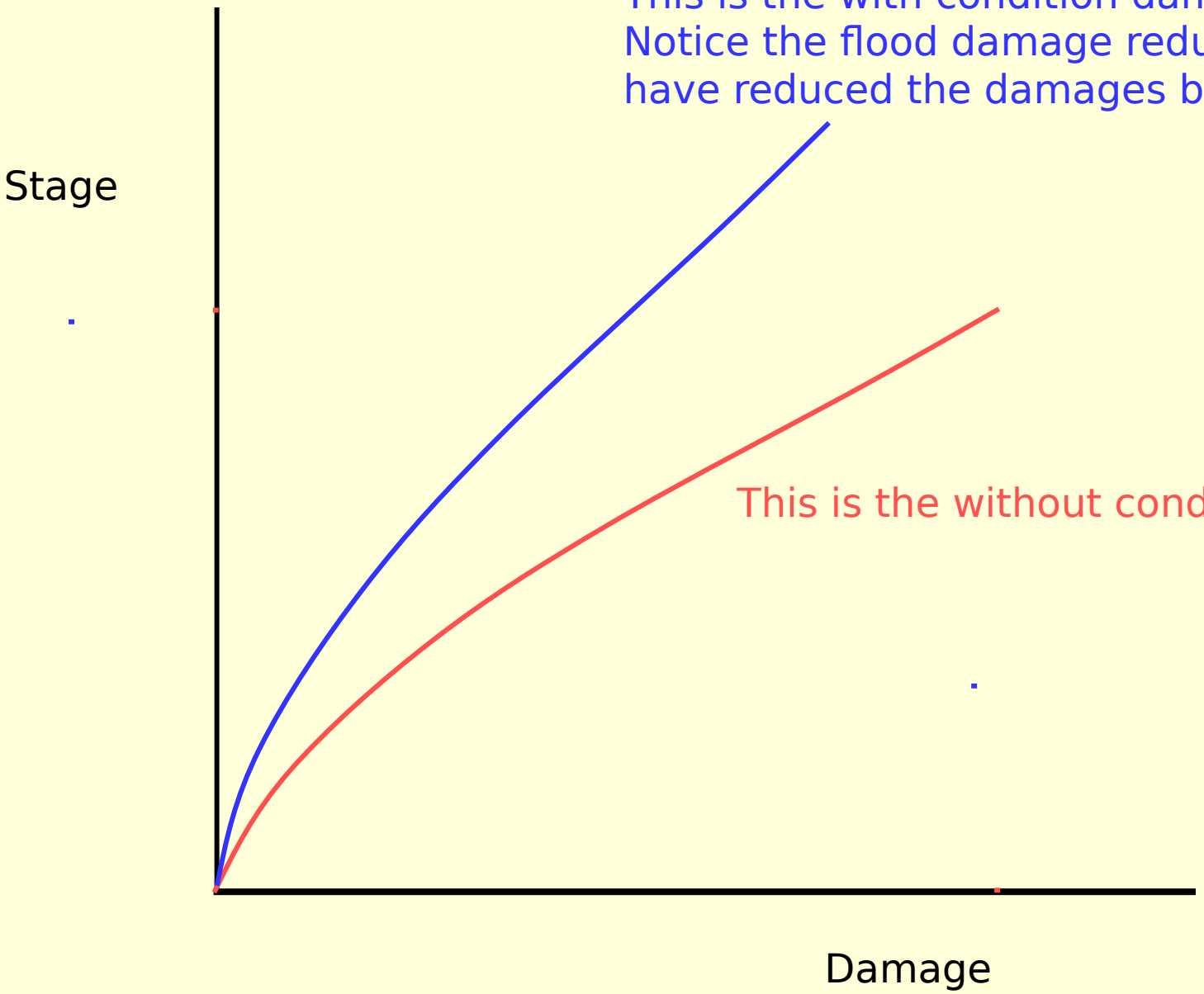

With condition damage curve
Stage
This much water
causes
'with' it
causes
Without condition damage curve
this much damage without a plan
this much damage
Damage

The blue curve is the with condition damage


Stage
A floodwall changes the damage curve. Stages that once caused damage, no longer do.
Once water reaches this stage the wall is overtopped and the damage curve returns to original pattern of damage
Above this stage, there is no protection
These stages no longer cause any damage
This is the without condition damage curve
Damage

How do floodwalls, levees and elevation changes affect the stage-damage cu


This is the with condition damage curve.
Notice the flood damage reduction measure(s
have reduced the damages but not to zero.
Stage
This is the without condition damage cu
Damage

Other measures affect the stage-damage curve differently.

What sorts of flood damage reduction measures might ‘lower’ the damage curve?

- Some possibilities include
  - Warning time
  - Structure modifications
  - Retrofitting/Floodproofing
  - Flood fighting
  - Relocation of facilities from hazardous locations
  - Road and bridge modifications
  - Use of flood-damage-resistant materials
  - Wetlands protection
  - Comprehensive planning
  - Zoning
  - Building codes
  - Open space preservation
  - Relocation
  - Acquisition